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Effective Date: November 29, 1996  
Expiration Date: June 30, 2000  
Modification Date: June 5, 2000  
Modification Date: January 20, 2004

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM  
WASTE DISCHARGE PERMIT

State of Washington  
DEPARTMENT OF ECOLOGY  
Olympia, Washington 98504-7775

In compliance with the provisions of  
The State of Washington Water Pollution Control Law  
Chapter 90.48 Revised Code of Washington  
and  
The Federal Water Pollution Control Act  
(The Clean Water Act)  
Title 33 United States Code, Section 1251 et seq.

**City of Chehalis**  
**Post Office Box 871**  
**Chehalis, Washington 98532**

Contributing Jurisdictions

City of Napavine  
Post Office Box 556  
Napavine, Washington 98565

Lewis County Sewer District No. 1  
Post Office Box 1122  
Chehalis, Washington 98532

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Plant Location:

1191 NW Shoreline Drive  
Chehalis, Washington

Receiving Water:

Chehalis River  
River Mile 74.3

Water Body I.D. No.:

WA-23-1020

Discharge Location:

Latitude: 46° 39' 38" N  
Longitude: 122° 59' 03" W

Plant Type:

Trickling Filter/Activated Sludge

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is authorized to discharge in accordance with  
the special and general conditions which follow.

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Kelly Susewind, P.E., P.G.  
Southwest Region Manager  
Water Quality Program  
Washington State Department of Ecology

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SUMMARY OF SCHEDULED PERMIT REPORT SUBMITTALS

Permit Section	Submittal	Frequency	First Submittal Date
S1.F.	Schedule for meeting final effluent limits	1/permit cycle	June 30, 2000
S3.A.	Discharge Monitoring Report	Monthly, no later than the 15th day of the month following the completed reporting period	December 15, 1996
S4.B.	Plan for maintaining adequate capacity	as necessary	
S4.C.	Notification of new or altered sources	as necessary	
S4.D.3	Annual Assessment of Flow and Waste Load	annually	May 15, 1999
S4.E.	I/I Reduction Program	as required	December 31, 2001*
S5.D.	Notice of Short-term Reduction in Treatment Level	as necessary	
S6.	Report on Construction- or Maintenance-related Bypass	as necessary	
S8.B.	Notice of New Significant Industrial Users	as necessary	
S8.E.	Notice of Industrial User Violations	as necessary	
S8.F.	Industrial User Survey Update	1/permit cycle	June 30, 2003
S9.A.	Priority Pollutant Scan Monitoring	2/first year; 2/second year	60 days after each sampling event
S10.	Existing Outfall Replacement Evaluation Report	as required	June 30, 2003
G17.	Application for permit renewal	1/permit cycle	June 30, 2003

\*Required documents may be deferred as per Special Condition S.4.E of permit.

## SPECIAL CONDITIONS

### S1. EFFLUENT LIMITATIONS

In addition to the terms and conditions in this permit, the operation of the Wastewater Treatment Plant is subject to the provisions of the Consent Decree, entered on January 14, 2000, in the matter of *Centralia, et al. v. EPA, et al.*, Civil Action No. 96-5968RJB, United States District Court for the Western District of Washington at Tacoma.

#### A. Interim Effluent Limitations

Beginning on the effective date of this permit and lasting through the date for “Compliance with Final Effluent Limits” (see Permit Special Condition S1.F), the Permittee is authorized to discharge municipal wastewater at the permitted location in the Centralia Reach of the Chehalis River subject to the following limitations:

<b>INTERIM EFFLUENT LIMITATIONS<sup>a</sup> (May - October)</b>		
<b>Parameters</b>	<b>Monthly Average</b>	<b>Weekly Average</b>
BOD <sub>5</sub> <sup>b</sup>	20 mg/l, 334 lbs/day 85 percent removal	30 mg/l, 500 lbs/day
TSS <sup>c</sup>	25 mg/l, 417 lbs/day 85 percent removal	37.5 mg/l, 626 lbs/day
Fecal Coliform Bacteria	200/100 mL	400/100 mL
pH	shall not be outside the range of 6.0 to 9.0	
<b>Parameters</b>	<b>Monthly Average</b>	<b>Daily Maximum</b>
Total Chlorine Residual	0.021 mg/L	0.023 mg/L
Ammonia (NH <sub>3</sub> -N)	18.6 mg/L	36.8 mg/L
<b>INTERIM EFFLUENT LIMITATIONS<sup>a</sup> (November - April)</b>		
<b>Parameters</b>	<b>Monthly Average</b>	<b>Weekly Average</b>
BOD <sub>5</sub> <sup>d</sup>	30 mg/l, 1000 lbs/day 75 percent removal	45 mg/l, 1500 lbs/day
TSS <sup>e</sup>	30 mg/l, 1000 lbs/day 65 percent removal	45 mg/l, 1500 lbs/day
Fecal Coliform Bacteria	200/100 mL	400/100 mL
pH	shall not be outside the range 6.0 to 9.0	
<b>Parameters</b>	<b>Monthly Average</b>	<b>Daily Maximum</b>
Total Chlorine Residual	0.023 mg/L	0.026 mg/L
Ammonia (NH <sub>3</sub> -N)	12.9 mg/L	31.6 mg/L

<sup>a</sup> The average monthly and weekly effluent limitations are based on the arithmetic mean of the samples taken with the exception of fecal coliform, which is based on the geometric mean.

<sup>b</sup> The average monthly effluent concentration for BOD<sub>5</sub> shall not exceed 20 mg/L or 15 percent of the respective monthly average influent concentrations, whichever is more stringent.

<sup>c</sup> The average monthly effluent concentration for Total Suspended Solids shall not exceed 25 mg/L or 15 percent of the respective monthly average influent concentrations, whichever is more stringent.

<sup>d</sup> The average monthly effluent concentration for BOD<sub>5</sub> shall not exceed 30 mg/L or 25 percent of the respective monthly average influent concentrations, whichever is more stringent.

<sup>e</sup> The average monthly effluent concentration for TSS shall not exceed 30 mg/L or 35 percent of the respective monthly average influent concentrations, whichever is more stringent.

B. Final Effluent Limitations During Dry Weather

In accordance with the compliance schedule in paragraph V.5.C of the attached Consent Decree, and lasting through the expiration date of the applicable permit, the Permittee is authorized to discharge municipal wastewater at (1) an approved location downstream of the Skookumchuck River, subject to the following conditions and limitations; or (2) an approved location and method subject to effluent limitations to be determined (see Section F. Schedule for Meeting Final Effluent Limits.)

1. Dry weather limits (except ammonia) shall apply on the next day after the 7-day moving average flow in the Centralia Reach of the Chehalis River goes below 1,000 cfs and on all subsequent days until the wet weather limits apply.
2. The flow in the Centralia Reach shall be determined by the USGS Grand Mound gage (12-027500) using the equation  $y = 0.7396 x - 28.28$  ("y" is the calculated flow (cfs) in the Centralia Reach; "x" is the recorded flow (cfs) as measured at the Grand Mound gage; cfs means cubic feet per second).
3. A gaging station installed in or near the Centralia Reach may be used as the definitive measure of flows in the Centralia Reach in lieu of flows calculated in Item 2.
4. When daily flows in the Centralia Reach are less than 200 cfs, more stringent effluent limits shall apply, as noted in the following table. A direct measurement from the Ground Mound gage at 300 cfs shall be deemed equivalent to the 200 cfs level in the Centralia Reach.
5. Dry weather limits for ammonia shall go into effect 14 days after the 7-day moving average flow in the Centralia Reach is less than 1,000 cfs. The 14-day phase-in period shall be triggered no earlier than March 1 of each year (March 15<sup>th</sup> is the earliest date that dry weather limits would apply).

FINAL EFFLUENT LIMITATIONS <sup>a</sup> (Dry Weather)		
Parameters	Monthly Average	Daily Maximum
BOD <sub>5</sub> <sup>b</sup> Flows < 200cfs Flows > 200cfs < 1000 cfs	20 mg/L, 417 lbs/day 20 mg/L, 500 lbs/day 85 percent removal	30 mg/l, 626 lbs/day 30 mg/l, 751 lbs/day
TSS <sup>b</sup> Flows < 200cfs Flows > 200cfs < 1000 cfs	20 mg/l, 417 lbs/day 20 mg/l, 500 lbs/day 85 percent removal	30 mg/l, 626 lbs/day 30 mg/l, 751 lbs/day
Total Chlorine Residual	0.021 mg/L	0.023 mg/L
pH	shall not be outside the range 6.0 to 9.0	
Parameters	Monthly Average	Weekly Average
Fecal Coliform Bacteria	200/100 mL	400/100 mL
		<b>March 15 through November 30</b>
<b>Parameter</b>	<b>Daily Maximum</b>	
Ammonia (NH <sub>3</sub> -N) Flows < 200 cfs Flows > 200 cfs < 1000 cfs	4.0 mg/L, 83 lbs/day 4.0 mg/L, 100 lbs/day	
		<b>December 1 through March 14</b>
<b>Parameter</b>	<b>Daily Maximum</b>	
Ammonia (NH <sub>3</sub> -N)	15 mg/L, 375 lbs/day	

<sup>a</sup> The average monthly and weekly effluent limitations are based on the arithmetic mean of the samples taken with the exception of fecal coliform, which is based on the geometric mean.

<sup>b</sup> The average monthly effluent concentration for BOD<sub>5</sub> and Total Suspended Solids shall not exceed 20 mg/L or 15 percent of the respective monthly average influent concentrations, whichever is more stringent.

C. Final Effluent Limitations During Wet Weather

Beginning on the date for “Compliance with Final Effluent Limits” (see Permit Special Condition S1.F), and lasting through the expiration date of the applicable permit, the Permittee will be authorized to discharge municipal wastewater to the Centralia Reach of the Chehalis River, subject to the following conditions and limitations:

1. Wet weather limits shall apply on the next day after the 7-day moving average flow in the Centralia Reach of the Chehalis River is greater than 1,000 cfs and the daily flow of the Centralia Reach has been greater than 2,500 cfs during at least one day of the preceding seven days.
2. The flow in the Centralia Reach shall be determined by the USGS Ground Mound gage (12-027500) using the equation  $y = 0.7396 x - 28.28$  ("y" is the calculated flow (cfs) in the Centralia Reach, "x" is the recorded flow (cfs) as measured at the Ground Mound gage).

FINAL EFFLUENT LIMITATIONS <sup>a</sup> (Wet Weather)		
Parameters	Monthly Average	Daily Maximum
BOD <sub>5</sub> <sup>b</sup>	30 mg/l, 732 lbs/day 85 percent removal <sup>c</sup>	45 mg/l, 2330 lbs/day
TSS <sup>b</sup>	30 mg/l, 768 lbs/day <sup>c</sup> 85 percent removal	45 mg/l, 2330 lbs/day
Fecal Coliform Bacteria	200/100 mL	400/100 mL
pH	shall not be outside the range 6.0 to 9.0	
Parameters	Daily Maximum	
Ammonia (NH <sub>3</sub> -N)	15 mg/L, 644 lbs/day	

<sup>a</sup> The average monthly and weekly effluent limitations are based on the arithmetic mean of the samples taken with the exception of fecal coliform, which is based on the geometric mean.

<sup>b</sup> The average monthly effluent concentration for BOD<sub>5</sub> and Total Suspended Solids shall not exceed 30 mg/L or 15 percent of the respective monthly average influent concentrations, whichever is more stringent.

<sup>c</sup> In accordance with WAC 173-221-050, the Permittee is authorized to submit supporting documentation for alternative final effluent limitations.

D. Interim Metals Effluent Limitations

Beginning on the effective date of this permit and lasting through the date for compliance with Final Metals Effluent Limits (see Permit Special Condition S1.E), the Permittee is authorized to discharge municipal wastewater at the permitted location subject to the following interim metals effluent limitations:



<b>INTERIM METALS EFFLUENT LIMITATIONS</b>		
<b>Parameter</b>	<b>Daily Maximum</b>	<b>Yearly Average</b>
Copper	53.5 µg/L	n/a
Silver	28.2 µg/L	13.5 µg/L
Zinc	119.6 µg/L	n/a

See Footnotes, below Section S1.E

E. Final Metals Effluent Limitations

The Permittee shall submit a schedule and plan for meeting final effluent limits for metals (copper, silver, and zinc) to the Department for approval within sixty days of the effective date of this permit. The schedule shall consider the following:

1. Submittal and approval of a metals sampling plan, completion of the metals sampling, and submittal of the metals analysis report within thirty-six months of the date of permit modification.
2. Meeting effluent metals limits at the earliest possible date.
3. Requirements imposed upon local industries through the City's Sewer Ordinance and state or federal permitting program.

Depending on the results of the metals sampling study or the industrial pretreatment program, the Department may review an additional twenty-four months of metals monitoring data.

The Department will modify the final effluent limits for those metals that are appropriate for modification based on the above conditions.

<b>FINAL METALS EFFLUENT LIMITATIONS</b>		
<b>Dry Weather</b>		
<b>Parameter</b>	<b>Monthly Average</b>	<b>Daily Maximum</b>
Copper	9.69 µg/L	10.63 µg/L
Silver	1.27 µg/L	1.39 µg/L
Zinc	69.6 µg/L	76.3 µg/L
<b>Wet Weather</b>		
Copper	10.9 µg/L	12.0 µg/L
Silver	1.29 µg/L	1.41 µg/L
Zinc	78.3 µg/L	85.9 µg/L

Footnotes for All Metals:

<sup>(1)</sup> The method detection level (MDL) for copper is 1 µg/L using graphite furnace atomic absorption spectrometry and method number 220.2 from 40 CFR Part 136. The quantitation level (QL) for copper is 5 µg/L (5 x MDL).

<sup>(1)</sup> The method detection level (MDL) for silver is 0.2 µg/L using graphite furnace atomic absorption spectrometry and method number 272.2 from 40 CFR Part 136. The quantitation level (QL) for silver is 1 µg/L (5 x MDL).

<sup>(1)</sup> The MDL for zinc is 2 µg/L using inductively coupled plasma and method number 200.7 from 40 CFR Part 136. The quantitation level (QL) for zinc is 10 µg/L (5 x MDL).

These QLs will be used for assessment of compliance with these effluent limits. If the Permittees are unable to attain the MDL and QL in its effluent due to matrix effects, the Permittees shall submit a matrix specific MDL and QL to the Department by (nine months after issuance). The matrix specific MDL and QL shall be calculated as follows:

MDL = 3.14 x (standard deviation of 7 replicate spiked samples). This corresponds to the calculation of the method detection limit, as defined in 40 CFR Part 136, Appendix B, with the provision that the MDL be calculated for a specific effluent matrix.

The QL = 5 x MDL

Check standards at concentrations equal to the QL shall be analyzed alongside all compliance monitoring samples. Check standards shall be produced independently of calibration standards and maintained as a part of the Permittees' records. All check standard recovery data and duplicate measurements shall be submitted to the Department in the discharge monitoring report. The Department's precision goal is +/- 20 percent.

<sup>(2)</sup> If the daily maximum measured effluent concentration is below the QL as determined in Footnote #1 above, the Permittees shall report NQ for non-quantifiable.

<sup>(3)</sup> Average values shall be calculated as follows: measurements below the MDL = 0; measurements greater than the MDL = the measurement. When only one sample is taken during the sampling period, that value is reported as the average. If, the permittees elect to take additional samples during the sample period, the reported value shall be the average of the sample values.

F. Schedule For Meeting Final Effluent Limits (S1.B. and S1.C.)

The Department has determined that a schedule will be required to ensure final compliance with the Water Quality-based effluent limits in the shortest practicable time. Meeting the final effluent limits will require the permittee to plan, design, and construct necessary treatment capability to meet the required effluent limits. Therefore, the Permittee shall submit a schedule to Ecology for approval by June 30, 2000, that achieves full compliance with final effluent limitations in accordance with paragraph V.5.C.(iv) of Consent Decree No. C96-5968 RJB. NPDES Permit No. WA0021105 for the City of Chehalis will be modified to include the approved schedule for compliance with final effluent limitations. The final schedule approved by the Department will include the following statement:

“When the Permittee notifies the Department that conditions in Paragraph V.5.C.(iv) of Consent Decree No. 96-5968RJB have been met, the Permittee shall receive a two-year extension of the date for compliance with all compliance dates.”

G. Effluent Mixing Zones

This Section includes descriptions of the effluent mixing zones and dilution ratios for the May through October and November through April discharge periods. Since this permit requires the development of planning, design, and construction of a facility to meet final effluent limitations for dry and wet weather, this section is changed to include the generic references to mixing zones and for the calculation of dilution that apply to both the existing and design location.

The maximum size of a mixing zone shall comply with the following:

The Chronic mixing zone, singularly or in combination with other mixing zones, shall comply with the most restrictive combination of the following:

- (i) Not extend in a downstream direction for a distance from the discharge port(s) greater than three hundred feet plus the depth of water over the discharge port(s), or extend upstream for a distance of over one hundred feet;
- (ii) Not utilize greater than twenty-five percent of the flow (Existing chronic dilution: May through October = 5.20 and November through April = 10.6); and
- (iii) Not occupy greater than twenty-five percent of the width of the water body.

The zone of acute criteria exceedance shall singularly or in combination with other such zones comply with the most restrictive combination of the following:

- (i) Not extend beyond ten percent of the distance towards the upstream and downstream boundaries of an authorized mixing zone, as measured independently from the discharge port(s);
- (ii) Not utilize greater than two and one-half percent of the flow (Existing acute dilution factor: May through October = 1.20 and November through April = 1.35); and
- (iii) Not occupy greater than twenty-five percent of the width of the water body.

S2. TESTING SCHEDULE

The Permittees shall monitor the wastewater and sludge according to the following schedules:

A. POTW Effluent Monitoring

Tests	Sample Point	Sampling Frequency	Sample Type
Flow, mgd	Influent	Continuous	Measurement
Rain, inches	At Site	Daily	Reading
Temperature	Final Effluent	Daily	Grab
pH	Final Effluent	Daily	Grab
BOD <sub>5</sub>	Infl.; Fin. Effl.	3/week; 3/week	24-hr. Composite
TSS	Infl. ; Fin. Effl.	3/week; 3/week	24-hr. Composite
Tot. Res. Cl <sub>2</sub>	Chlorinated Effl. <sup>b</sup> Fin. Effl. <sup>c</sup>	Daily Daily	Grab Grab
Ammonia-N	Final Effluent	Daily	Grab
Metals <sup>d</sup>	Final Effluent	Monthly	Grab
Dissolved Oxygen	Final Effluent	Daily	Grab
Fecal Coliform	Fin. Effl.	3/week <sup>e</sup>	Grab
RECORDING RIVER FLOWS FOR FINAL PERMIT LIMITATIONS			
Chehalis River flows <sup>f</sup>	Centralia Reach	7-day running average <sup>f</sup>	Recording
Chehalis River flows <sup>g</sup>	Centralia Reach	Flow > 200 cfs	Recording

<sup>a</sup>Samples for BOD<sub>5</sub> analysis may be taken before or after the disinfection process. If taken after, the sample must be dechlorinated and reseeded.

<sup>b</sup>Sample before dechlorination.

<sup>c</sup>Sample after dechlorination.

<sup>d</sup>Metals: Copper, Silver and Zinc.

<sup>e</sup>Sample concurrently with Total Residual Chlorination (before dechlorination).

<sup>f</sup>The 7-day running average shall be recorded for the Centralia Reach of the Chehalis River (see the second paragraph of Condition S1.B and S1.C, above). The Permittee shall **FLAG** the date that the effluent limitations change to either the Dry Weather (S1.B.) or Wet Weather (S1.C.) conditions, and shall submit the appropriate Discharge Monitoring Report.

<sup>g</sup>The Permittee shall **FLAG** the date that the mass discharges for BOD<sub>5</sub>, TSS and ammonia change on the appropriate Discharge Monitoring Report.

B. POTW Sludge Monitoring

Land Application (Sludge)	Frequency	Sample Type
Sludge weight and % total solids; Metals <sup>a</sup> ; Pathogen Reduction; Vector Attraction Reduction;	annually (1/year)	Grab
Nitrogen <sup>b</sup>	annually (1/year)	Grab

<sup>a</sup>Arsenic, cadmium, chromium, copper, lead, mercury, molybdenum, nickel, selenium, and zinc.

<sup>b</sup>TKN, NH<sub>3</sub>-N, and NO<sub>3</sub>-N.

S3. MONITORING AND REPORTING

The Permittees shall monitor and report in accordance with the following conditions.

A. Reporting

Monitoring results obtained during the previous month shall be summarized and reported on a form provided, or otherwise approved, by the Department, to be submitted no later than the 15th day of the month following the completed reporting period. The report(s) shall be sent to the Department of Ecology, Southwest Regional Office Lacey, Washington 98504. Monitoring shall be started on the effective date of the permit and the first report is due on the 15th day of the following month.

B. Records Retention

The Permittees shall retain records of all monitoring information, including all calibration and maintenance records and all original recordings for continuous monitoring instrumentation, copies of all reports required by this permit, and records of all data used to complete the application for this permit, for a period of at least 3 years. The Permittees shall retain for a minimum of five (5) years all records pertaining to the monitoring of sludge. This period of retention shall be extended during the course of any unresolved litigation regarding the discharge of pollutants by the Permittees or when requested by the Director.

C. Recording of Results

For each measurement or sample taken, the Permittees shall record the following information: (1) the date, exact place and time of sampling; (2) the individual who performed the sampling or measurement; (3) the dates the analyses were performed; (4) who performed the analyses; (5) the analytical techniques or methods used; and (6) the results of all analyses.

Modification Date: January 20, 2004

D. Representative Sampling

Samples and measurements taken to meet the requirements of this permit shall be representative of the volume and nature of the monitored discharge, including representative sampling of any unusual discharge or discharge condition, including bypasses, upsets and maintenance-related conditions affecting effluent quality.

E. Test Procedures

All sampling and analytical methods used to meet the wastewater monitoring requirements specified in this permit shall conform to the *Guidelines Establishing Test Procedures for the Analysis of Pollutants* contained in 40 CFR Part 136, unless otherwise specified in this permit or approved in writing by the Department.

Sludge monitoring requirements specified in this permit shall be conducted according to test procedures specified in 40 CFR Part 503.

F. Flow Measurement

Appropriate flow measurement devices and methods consistent with accepted scientific practices shall be selected and used to ensure the accuracy and reliability of measurements of the volume of monitored discharges. The devices shall be installed, calibrated, and maintained to ensure that the accuracy of the measurements are consistent with the accepted industry standard for that type of device. Frequency of calibration shall be in conformance with manufacturer's recommendations or at a minimum frequency of at least one calibration per year. Calibration records shall be retained for at least three years.

G. Laboratory Accreditation

All monitoring data, except for flow, temperature, settleable solids, conductivity, pH, and internal process control parameters, shall be prepared by a laboratory registered or accredited under the provisions of, Accreditation of Environmental Laboratories, Chapter 173-50 WAC. Conductivity and pH shall be accredited if the laboratory must otherwise be registered or accredited. Soils and hazardous waste data are exempted from this requirement pending accreditation of laboratories for analysis of these media by the Department.

H. Additional Monitoring by the Permittees

If the Permittees monitors any pollutant more frequently than required by this permit (S2.) using test procedures specified by Condition S3.E. of this permit, then the results of this monitoring shall be included in the Permittees' self-monitoring reports.

I. Signatory Requirements

All applications, reports, or information submitted to the Department shall be signed and certified.

1. All permit applications shall be signed by either a principal executive officer or ranking elected official.

2. All reports required by this permit and other information requested by the Department shall be signed by a person described above or by a duly authorized representative of that person. A person is a duly authorized representative only if:
  - a. The authorization is made in writing by a person described above and submitted to the Department, and
  - b. The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility, such as the position of plant manager, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters. (A duly authorized representative may thus be either a named individual or any individual occupying a named position.)
3. Changes to authorization. If an authorization under paragraph I.2.b is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of I.2.b must be submitted to the Department prior to or together with any reports, information, or applications to be signed by an authorized representative.
4. Certification. Any person signing a document under this section shall make the following certification:

"I certify under penalty of law, that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for willful violations."

#### S4. PREVENTION OF FACILITY OVERLOADING

##### A. Design Criteria

Flows or waste loadings of the following design criteria for the permitted treatment facility shall not be exceeded.

##### Existing Design Criteria

Average flow for the maximum wet month: ..... 4.0 MGD  
Influent BOD<sub>5</sub> loading for maximum month: ..... 4880 lbs/day  
Influent TSS loading for maximum month: ..... 5125 lbs/day  
Design population: ..... 14,458

##### Final Design Criteria

Maximum daily flow when river flow < 200 cfs ..... 2.5 MGD  
Maximum daily flow when river flow > 200 cfs < 1000 cfs ..... 3.0 MGD  
Maximum daily flow when river flow > 1000 cfs ..... 13.0 MGD

##### B. Plans for Maintaining Adequate Capacity

When the actual flow or wasteload reaches 85 percent of any one of the design criteria in S4.A. for three consecutive months, or when the projected increases would reach design capacity within five years, whichever occurs first, the Permittees shall submit to the Department, a plan and a schedule for continuing to maintain capacity at the facility sufficient to achieve the effluent limitations and other conditions of this permit. This plan shall address any of the following actions or any others necessary to meet this objective.

1. Analysis of the present design including the introduction of any process modifications that would establish the ability of the existing facility to achieve the effluent limits and other requirements of this permit at specific levels in excess of the existing design criteria specified in paragraph A above.
2. Reduction or elimination of excessive infiltration and inflow of uncontaminated ground and surface water into the sewer system.
3. Limitation on future sewer extensions or connections or additional wasteloads.
4. Modification or expansion of facilities necessary to accommodate increased flow or wasteload.
5. Reduction of industrial or commercial flows or waste loads to allow for increasing sanitary flow or wasteload.

The plan must meet the requirements of WAC 173-240-060, "Engineering Report," and be approved by the Department prior to any construction. The plan shall specify any contracts, ordinances, methods for financing, or other arrangements necessary to achieve this objective.

C. Notification of New or Altered Sources

The Permittees shall submit written notice to the Department whenever any new discharge or increase in volume or change in character of an existing discharge into the sewer is proposed which: (1) would interfere with the operation of, or exceed the design capacity of, any portion of the collection or treatment system; (2) would increase the total system flow or influent waste loading by more than 10 percent; (3) is not part of an approved general sewer plan or approved plans and specifications; or would be subject to pretreatment standards under 40 CFR Part 403 and Section 307(b) of the Clean Water Act. This notice shall include an evaluation of the system's ability to adequately transport and treat the added flow and/or wasteload.

D. Annual Assessment for Flow and Waste Load

1. Chehalis, Napavine, and Lewis County Sewer District No. 1 shall continue to monitor the infiltration and inflow in their respective collection systems. Plant and pump station monitoring records may be used to assess measurable infiltration and inflow. If infiltration and inflow have increased by more than 15 percent from that found in the first report based on equivalent rainfall, the Permittee and Contributing Jurisdictions shall assess the cost effectiveness for: (1) locating the sources of infiltration and inflow; and (2) correcting the problem.
2. The Permittees shall also conduct an annual assessment of the WWTP flow and waste load. A report shall be completed that contains the following: an indication of compliance or noncompliance with the permit effluent limitations; a comparison



between the existing and design monthly average dry weather flows, peak flows, BOD, and total suspended solids loadings; (except for the first report) and the percentage increase in these parameters since the last annual report. The report shall also state the present and design population or population equivalent and projected population growth rate.

3. The report shall be submitted to the Department by May 15, 1999, and annually thereafter. The requirement for annual review and reporting may be waived by the Department if the reports do not indicate a need for review at that frequency.

S5. OPERATION AND MAINTENANCE OF MUNICIPAL FACILITIES

A. Certified Operator

In accordance with Chapter 173-230 WAC, the Permittees shall provide an adequate operating staff which is qualified to carry out the operation, maintenance, and testing activities required to ensure compliance with the conditions of this permit. An operator certified for a Class III plant by the state of Washington shall be in responsible charge of the day-to-day operation of the wastewater treatment plant. A Class II operator shall be present at the facility during all shifts when operational changes are made to the treatment process.

B. O & M Manual

The approved operation and maintenance manual shall be kept available at the treatment plant. The operation and maintenance manual shall contain the plant process control monitoring schedule. All operators are responsible for being familiar with, and using, this manual. The operation and maintenance manual shall be updated as needed. Updated portions of the operations and maintenance manual shall be submitted to the Department for review and approval.

C. O & M Program

The Permittees shall maintain an adequate operation and maintenance program for their entire sewage system. Maintenance records shall be maintained on all major electrical and mechanical components of the treatment plant, as well as the sewage system and pumping stations. Such records shall clearly specify the frequency and type of maintenance recommended by the manufacturer and shall show the frequency and type of maintenance performed. These maintenance records shall be available for inspection at all times.

D. Short-Term Reduction

If a Permittees contemplates a reduction in the level of treatment that would cause an exceedance of permit effluent limitations on a short-term basis for any reason, and such reduction cannot be avoided, the Permittees shall give written notification to the Department, if possible, 30 days prior to such activities, detailing the reasons for, length of time of and the potential effects of the reduced level of treatment. If such a reduction involves a bypass, the requirements of Conditions G5. and S6. apply.

E. Electrical Power Failure

The Permittees are responsible for maintaining adequate safeguards to prevent the discharge of untreated wastes or wastes not treated in accordance with the requirements of this permit during electrical power failure at the treatment plant and/or sewage lift stations either by means of alternate power sources, standby generator, or retention of inadequately treated wastes. The Permittees shall maintain Reliability Class II at the wastewater treatment plant, which requires primary sedimentation and disinfection.

F. Prevent Connection of Inflow

The Permittees shall strictly enforce their sewer ordinances and not allow the connection of inflow (roof drains, foundation drains, etc.) to the sanitary sewer system.

S6. CONSTRUCTION OR MAINTENANCE-RELATED OVERFLOW OR BYPASS

Bypasses of untreated or partially treated sewage during construction or maintenance shall be avoided if at all feasible.

If a construction or maintenance-related overflow or bypass is contemplated, the Permittees shall submit to the Department, not less than 90 days prior to the contemplated overflow or bypass, a report which describes in detail any construction work which will result in overflow or bypass of wastewater. The report shall contain: (1) an analysis of all known alternatives which would eliminate, reduce, or mitigate the need for bypassing; (2) a cost-effectiveness analysis of alternatives including comparative resource damage assessment; (3) the minimum and maximum duration of bypass under each alternative; (4) a recommendation as to the preferred alternative for conducting the bypass; (5) the project date of bypass initiation; (6) a statement of compliance with the State Environmental Policy Act (SEPA); and (7) a request for a water quality modification, as provided for in WAC 173-201A-110.

For probable construction bypasses, the need to bypass is to be identified as early in the planning process as possible. The analysis required above shall be considered during preparation of the engineering report or facilities plan and plans and specifications and shall be included to the extent practical. In cases where the probable need to bypass is determined early, continued analysis is necessary up to and including the construction period in an effort to minimize or eliminate the bypass.

Final authorization to bypass may be granted after review of the above information, in accordance with General Condition G5. Authorization to bypass will be by administrative order.

S7. RESIDUAL SOLIDS

Residual solids include screenings, grit, scum, primary sludge, waste activated sludge, and other solid waste. The Permittee shall store and handle all residual solids in such a manner so as to prevent their entry into state ground or surface waters. The Permittee shall not discharge leachate from residual solids to state surface or ground waters.

S8. PRETREATMENT

A. General Requirements

The Permittees shall work cooperatively with the Department to ensure that all commercial and industrial users of the wastewater treatment system are in compliance with the pretreatment regulations promulgated in 40 CFR Part 403 and any additional pretreatment regulations that may be promulgated under Section 307(b) and reporting requirements under Section 308 of the Federal Clean Water Act.

B. Discharge Authorization Required

Significant commercial or industrial operations shall not be allowed to discharge wastes to the Permittees' sewerage system until they have received prior authorization from the Department in accordance with Chapter 90.48 RCW and Chapter 173-216 WAC, as amended. The Permittees shall immediately notify the Department of any proposed new sources, as defined in 40 CFR 403.3(k), from significant commercial or industrial operations.

C. General Prohibitions

In accordance with 40 CFR 403.5(a), a nondomestic discharger may not introduce into the Permittees' sewerage system any pollutant(s) that cause pass through or interference.

D. Specific Prohibitions

In accordance with 40 CFR 403.5(b), the following nondomestic discharges shall not be discharged into the Permittees' sewerage treatment system.

1. Pollutants that create a fire or explosion hazard in the POTW (including, but not limited to waste streams with a closed cup flashpoint of less than 140 degrees Fahrenheit or 60 degrees Centigrade using the test methods specified in 40 CFR 261.21).
2. Pollutants that will cause corrosive structural damage to the Publicly Owned Treatment Works (POTW), but in no case discharges with pH lower than 5.0 standard units, unless the works are specifically designed to accommodate such discharges.
3. Solid or viscous pollutants in amounts that could cause obstruction to the flow in sewers or otherwise interfere with the operation of the POTW.
4. Any pollutant, including oxygen demanding pollutants, (BOD, etc.) released in a discharge at a flow rate and/or pollutant concentration which will cause interference with the POTW.
5. Heat in amounts that will inhibit biological activity in the POTW resulting in interference, but in no case heat in such quantities such that the temperature at the POTW exceeds 40<sup>0</sup>C (104<sup>0</sup>F) unless the Department, upon request of the Permittees, approves, in writing, alternate temperature limits.
6. Petroleum oil, nonbiodegradable cutting oil, or products of mineral oil origin in amounts that will cause interference or pass through.
7. Pollutants which result in the presence of toxic gases, vapors, or fumes within the POTW in a quantity which may cause acute worker health and safety problems.
8. Any trucked or hauled pollutants, except at discharge points designated by the Permittees.

E. Notification of Industrial User Violations

The Permittees shall notify the Department upon the discovery that any nondomestic user violates the prohibitions listed in S8.C and S8.D above.

F. Pretreatment Support Tasks

In addition to immediate notification of new significant industrial users, the Permittee will, on an annual basis, survey all non-domestic dischargers in accordance with Department guidance for such surveys. No later than 180 days prior to expiration of this permit, the Permittee shall send a copy of the most recent annual survey to the Department.

Upon notification by the Department or upon finding that any pollutant has caused pass

through or interference, the Permittee shall develop appropriate local limits in accordance with Department guidance, including such sampling as may be required from which to technically base such limits.

In the event that the Department has determined that local limits are necessary, the Permittee shall, upon being notified of appropriate limits, take all measures required to codify these or any more stringent limits, along with other appropriate language within six months of the date of establishment of the limits.

The City of Napavine and Lewis County Sewer District No. 1 shall submit to the City of Chehalis the necessary information and provide the necessary cooperation to comply with the requirements of this provision.

S9. PRIORITY POLLUTANT SCAN

A. Testing Requirements

1. The Permittee shall conduct priority pollutant scan analyses of effluent samples collected from the wastewater treatment facility in accordance with protocols, monitoring requirements, and QA/QC procedures specified in this section.
2. Effluent samples shall be analyzed for priority pollutants as contained in 40 CFR part 122, Appendix D, Table II (organics) and Table III (metals and cyanide). Other toxic pollutants which should be monitored for if likely present are listed in 40 CFR part 122, Appendix D, Table V. A written report shall be submitted to the Department within 60 days after each sampling event noted in Section B.1 and 2, below.
3. In the event additional pollutants of concern are detected, the Permittee shall retest as per Section B.3, below, and submit a report to the Department within 60 days of the end of that period.

B. Monitoring Requirements

1. The following samples shall be collected for analyses: 1) one sample of the effluent from wastewater treatment facility collected during the dry season (May through October) of years one and two of the permit; and 2) one sample of effluent from wastewater treatment facility collected during the wet season (November through April) of years one and two of the permit.
2. Each sample of the effluent shall be representative composite consisting of continuous sampling or six grab samples equally spaced over a 24-hour period.
3. All pollutants that are detected shall be retested at least once per month for three months.
4. If a pollutant continues to be detected, continue testing that pollutant once per month for one year or until twelve reliable tests are collected.

C. Protocols

Sample analysis shall be conducted with the most sensitive testing method available, that detects the pollutants of concern, in accordance with 40 CFR Part 136 (see Table VI-3,

Chapter VI of Ecology's "Permit Writers Manual").

D. Quality Assurance/Quality Control Procedures

The Permittee shall follow the quality assurance procedures of 40 CFR Part 136.

S10. EXISTING OUTFALL REPLACEMENT EVALUATION REPORT

If the existing outfall location is to be utilized as the discharge point for compliance with the TMDL recommendations, the Permittees shall prepare design documents for evaluation and replacement of the outfall. The documents shall be prepared and submitted to the Department for review and approval, in accordance with the requirements of WAC 173-240-110. The schedule for the design documents and construction of a new outfall shall coincide with the schedule for compliance with the TMDL recommendations in Section S1.E.

## GENERAL CONDITIONS

### G1. DISCHARGE VIOLATIONS

All discharges and activities authorized by this permit shall be consistent with the terms and conditions of this permit. The discharge of any pollutant more frequently than, or at a concentration in excess of, that authorized by this permit shall constitute a violation of the terms and conditions of this permit.

### G2. PROPER OPERATION AND MAINTENANCE

The Permittees shall at all times properly operate and maintain all facilities and systems of collection, treatment, and control (and related appurtenances) which are installed or used by the Permittees for pollution control.

### G3. REDUCED PRODUCTION FOR COMPLIANCE

The Permittees, in order to maintain compliance with its permit, shall control production and/or all discharges upon reduction, loss, failure, or bypass of the treatment facility until the facility is restored or an alternative method of treatment is provided. This requirement applies in the situation where, among other things, the primary source of power of the treatment facility is reduced, lost, or fails.

### G4. NONCOMPLIANCE NOTIFICATION

If for any reason, the Permittees does not comply with, or will be unable to comply with, any of the discharge limitations or other conditions specified in the permit, the Permittees shall, at a minimum, provide the Department with the following information:

- A. A description of the nature and cause of noncompliance, including the quantity and quality of any unauthorized waste discharges;
- B. The period of noncompliance, including exact dates and times and/or the anticipated time when the Permittees will return to compliance; and
- C. The steps taken, or to be taken, to reduce, eliminate, and prevent recurrence of the noncompliance.

In addition, the Permittees shall take immediate action to stop, contain, and clean up any unauthorized discharges and take all reasonable steps to minimize any adverse impacts to waters of the state and correct the problem. The Permittees shall notify the Department by telephone so that an investigation can be made to evaluate any resulting impacts and the corrective actions taken to determine if additional action should be taken.

In the case of any discharge subject to any applicable toxic pollutant effluent standard under Section 307(a) of the Clean Water Act, or which could constitute a threat to human health, welfare, or the environment, 40 CFR Part 122 requires that the information specified in Sections G4.A., G4.B., and G4.C., above, shall be provided not later than 24 hours from the time the Permittees becomes aware of the circumstances. If this information is provided orally, a written submission covering these points shall be provided within five days of the time the Permittees becomes aware of the circumstances, unless the Department waives or extends this requirement on a case-by-case basis.

Compliance with these requirements does not relieve the Permittees from responsibility to maintain

continuous compliance with the conditions of this permit or the resulting liability for failure to comply.

G5. BYPASS PROHIBITED

The intentional bypass of wastes from all or any portion of a treatment works is prohibited unless the following four conditions are met:

- A. Bypass is: (1) unavoidable to prevent loss of life, personal injury, or severe property damage; or (2) necessary to perform construction or maintenance-related activities essential to meet the requirements of the Clean Water Act and authorized by administrative order;
- B. There are no feasible alternatives to bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, maintenance during normal periods of equipment down time, or temporary reduction or termination of production;
- C. The Permittees submits notice of an unanticipated bypass to the Department in accordance with Condition G4. Where the Permittees knows or should have known in advance of the need for a bypass, this prior notification shall be submitted for approval to the Department, if possible, at least 30 days before the date of bypass (or longer if specified in the special conditions);
- D. The bypass is allowed under conditions determined to be necessary by the Department to minimize any adverse effects. The public shall be notified and given an opportunity to comment on bypass incidents of significant duration, to the extent feasible.

"Severe property damage" means substantial physical damage to property, damage to the treatment facilities which would cause them to become inoperable, or substantial and permanent loss of natural resources which can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss caused by delays in production.

After consideration of the factors above and the adverse effects of the proposed bypass, the Department will approve or deny the request. Approval of a request to bypass will be by administrative order under RCW 90.48.120.

G6. RIGHT OF ENTRY

The Permittees shall allow an authorized representative of the Department, upon the presentation of credentials and such other documents as may be required by law:

- A. To enter upon the premises where a discharge is located or where any records must be kept under the terms and conditions of this permit;
- B. To have access to and copy at reasonable times any records that must be kept under the terms of the permit;
- C. To inspect at reasonable times any monitoring equipment or method of monitoring required in the permit;
- D. To inspect at reasonable times any collection, treatment, pollution management, or discharge facilities; and



- E. To sample at reasonable times any discharge of pollutants.

G7. PERMIT MODIFICATIONS

The Permittees shall submit a new application or supplement to the previous application where facility expansions, production increases, or process modifications will (1) result in new or substantially increased discharges of pollutants or a change in the nature of the discharge of pollutants, or (2) violate the terms and conditions of this permit.

G8. PERMIT MODIFIED OR REVOKED

After notice and opportunity for public hearing, this permit may be modified, terminated, or revoked during its term for cause including, but not limited to, the following:

- A. Violation of any terms or conditions of the permit;
- B. Failure of the Permittees to disclose fully all relevant facts or misrepresentations of any relevant facts by the Permittees during the permit issuance process;
- C. A change in any condition that requires either a temporary or a permanent reduction or elimination of any discharge controlled by the permit;
- D. Information indicating that the permitted discharge poses a threat to human health or welfare;
- E. A change in ownership or control of the source; or
- F. Other causes listed in 40 CFR 122.62 and 122.64.

Permit modification, revocation and reissuance, or termination may be initiated by the Department or requested by any interested person.

G9. REPORTING A CAUSE FOR MODIFICATION

A Permittees who knows or has reason to believe that any activity has occurred or will occur which would constitute cause for modification or revocation and reissuance under Condition G8. or 40 CFR 122.62 must report such plans, or such information, to the Department so that a decision can be made on whether action to modify or revoke and reissue a permit will be required. The Department may then require submission of a new application. Submission of such application does not relieve the Permittees of the duty to comply with the existing permit until it is modified or reissued.

G10. TOXIC POLLUTANTS

If any applicable toxic effluent standard or prohibition (including any schedule of compliance specified in such effluent standard or prohibition) is established under Section 307(a) of the Clean Water Act for a toxic pollutant and that standard or prohibition is more stringent than any limitation

upon such pollutant in the permit, the Department shall institute proceedings to modify or revoke and reissue the permit to conform to the new toxic effluent standard or prohibition.

G11. PLAN REVIEW REQUIRED

Prior to constructing or modifying any wastewater control facilities, detailed plans shall be submitted to the Department for approval in accordance with Chapter 173-240 WAC. Facilities shall be constructed and operated in accordance with the approved plan.

G12. OTHER REQUIREMENTS OF 40 CFR

All other requirements of 40 CFR 122.41 and 122.42 are incorporated in this permit by reference.

G13. COMPLIANCE WITH OTHER LAWS AND STATUTES

Nothing in the permit shall be construed as excusing the Permittees from compliance with any applicable federal, state, or local statutes, ordinances, or regulations.

G14. ADDITIONAL MONITORING

The Department may establish specific monitoring requirements in addition to those contained in this permit by administrative order or permit modification.

G15. REVOCATION FOR NONPAYMENT OF FEES

The Department may revoke this permit if the permit fees established under Chapter 173-224 WAC are not paid.

G16. REMOVED SUBSTANCES

Collected screenings, grit, solids, sludges, filter backwash, or other pollutants removed in the course of treatment or control of wastewaters shall not be resuspended or reintroduced to the final effluent stream for discharge to state waters.

G17. DUTY TO REAPPLY

The Permittees must reapply, for permit renewal, at least 180 days prior to the specified expiration date of this permit.